



Photography: Dutch Greenhouse Delta

Joining forces for food safety and food security in the Gulf region

Foreword

Distinguished reader,

It is with great pride that I present to you the Netherlands' horticulture consortium "HortiRoad2theGulf". This consortium is the fruit of a public-private-knowledge sector partnership, focussed on the specific conditions of the Gulf region. Addressing strategic goals of enhanced food security and self-sufficiency, we emphasize water-saving and purification solutions, along with smart energy innovations. This is the embodiment of what we call the 'Water Energy and Food Nexus'. Cooperating closely with all stakeholders involved symbolizes the typical Dutch approach to solving global challenges together.

Food security is a top priority for all Gulf countries. To this day, the Gulf imports approximately 90% of its food needs. In recent years, the necessity to speed up efforts in enhancing food security was amplified – both on a national, regional, and global level. Moreover, increasing demand of a growing population, climate change, supply chain disruptions, aquifer depletion, and salinity are some of the major drivers for the food security agenda.

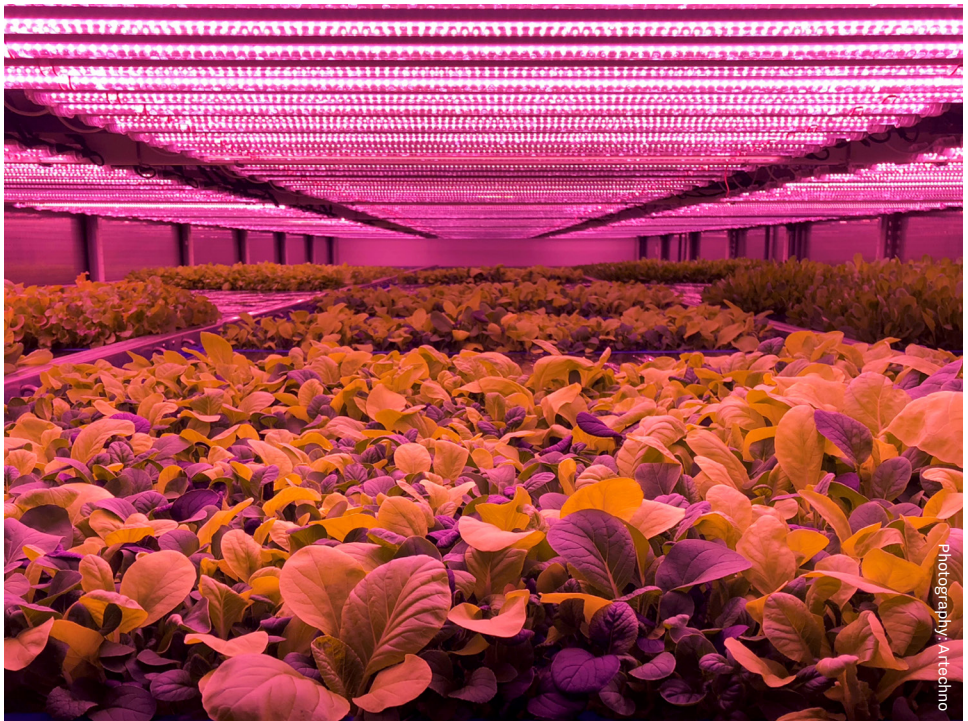
The Netherlands is your unwavering, trusted partner in achieving food security in a sustainable manner. By harnessing innovation, technology, and collaborative initiatives, we create sustainable solutions that enhance resilience, promote economic prosperity, and safeguard the well-being of our societies. Furthermore, the developments in the Gulf's horticultural sector offer many opportunities for intensifying cooperation between the Netherlands and the Gulf region. We are extremely proud to be part of these developments already. We look forward to upcoming trade missions, visits, and tailor-made training programs in the region.



Simone Landhuis
*Agricultural Counsellor to the GCC for
the Kingdom of the Netherlands*

Joining forces for food safety and food security in the Gulf region

To achieve food security for a growing and increasingly urbanised world's population, we need to substantially increase our supply of safe, nutritious and tasty food and reduce food loss. Feeding the city requires a whole new ecosystem. We offer sustainable integrated and total solutions in an ecosystem approach. Important parts of the ecosystem are breeding and propagation, growing young plants and vegetables, packaging and logistics, trade, retail and consumer marketing. Through long-term partnerships and by sharing our extensive knowledge and innovative technologies, the Netherlands helps other countries improve their food safety and reach food security.



Photography: A.Techno

Saudi Arabia, the United Arab Emirates and Qatar have the ambition to become more self-sufficient and produce more fresh and high-quality fruit and vegetables locally. Currently, much of the food required to feed the population is still imported from abroad, resulting in a considerable food loss because of long transportation chains. Moreover, it also makes Gulf countries vulnerable to fluctuations in the availability of food supplies on the world market, which is strongly impacted by geopolitics, logistics and climate change. COVID-19 only underlined what Gulf governments already knew: food security is a problem of the greatest urgency.

Towards a long-term partnership

We are ready to enter a long-term partnership to address regional food security. The United Arab Emirates, Saudi Arabia and Qatar are frontrunners in this region with their own food security and food safety strategies. The Dutch horticulture sector feeds millions of people around the world. We grow a wide variety of fruit and vegetables using state-of-the-art technology and sustainable techniques. By working together, we can significantly improve sustainable food production, reduce loss of food and develop new strategies and business models.

In the Netherlands, the government, companies, knowledge institutes and R&D centres develop the tools required to farm the future. HortiRoad2theGulf was established to help Saudi Arabia, the UAE and Qatar reach food self-sufficiency. Each cluster member has many years of experience working with Gulf partners, and is dedicated to establish a long-term partnership. In close cooperation with the Consulate General in Dubai and the Dutch Embassies in Riyadh, Abu Dhabi and Doha, we aim to support the Gulf region in growing a competitive local horticulture sector.

Promoting sustainable local production

With our combined knowledge, technology and experience we can accelerate achieving food security and food safety in your country. By adapting our proven technology to local circumstances, we can support you to produce ultra-fresh, safe and sustainable fruit and vegetables. All year round, against fair process, and as close to the point of consumption as possible. By bringing back sustainable food production to the world's largest urban areas, we can address issues such as climate change, biodiversity, food waste and public health.

Our cluster members stand ready to work with local farmers to upscale their business in a sustainable way. Together, we cover all aspects of sustainable horticulture and indoor farming, from breeding and growing to lighting, climate control and crop control. We want to hear from you what challenges you face, and we want to help you sharpen your business model. We can help you restore healthy soil conditions, share good agriculture practice, and assist you with logistics and consumer engagement. We can facilitate your transition from low and mid tech solutions to high tech solutions, and help you take the next step towards making your farm a more sustainable and profitable business.

SDGs

The Sustainable Development Goals (SDGs), also known as the Global Goals, were adopted by the United Nations in 2015 as a universal call to action to end poverty, protect the planet, and ensure that by 2030 all people enjoy peace and prosperity.

The Dutch horticultural cluster contributes to the achievement of the following sustainable development goals:



SDG 03 | Good health and well-being:

The aim of the cluster is to increase the availability of fresh, healthy and locally produced food.



SDG 08 | Decent work and economic growth:

Encouraging “fair” and “decent” work and involvement of the local community should promote economic growth.



SDG 11 | Sustainable cities and communities:

The cluster stimulates local and sustainable production through Dutch technology and knowledge transfer, such as reducing CO2 emissions and water.



SDG 12 | Responsible consumption and production:

The current Dutch horticultural technology can serve as an example for the transition towards climate-neutral production systems and already has many circular features.

Coordinators



Dutch Greenhouse Delta is a foundation that aims to promote the Dutch horticultural sector worldwide. Dutch Greenhouse Delta is the one-stop shop for complex, large-scale projects concerning food and floriculture issues in growing megacities. By working together with Dutch state-of-the-art partners in horticulture, they bring an integrated Fork2Farm solution that offers a complete ecosystem consisting of science, enterprise, education, and the government.

Partners



Artechno Growsystems is an engineering company engaged in the development and realisation of modern hydroponic cultivation systems. Among the products Artechno manufacture are robotics, irrigation systems, sowing solutions, harvesting lines and turnkey solutions for vertical farming and greenhouse hydroponics.



Bayer - De Ruiter

De Ruiter, part of the Bayer Crop Science division, specialises in the breeding, production and sale of hybrid seeds for greenhouse production. Together with its growers, the company is dedicated to bringing high-quality, nutritious produce to ensure a balanced plate for its global community.



BOAL Group

BOAL Group provides greenhouse builders with a comprehensive portfolio of modular systems and solutions for high-tech-covered cultivation. It ranges from complete aluminum greenhouse structures with integrated insect netting and ventilation solutions to insulated storage areas, climate screen systems, or individual greenhouse parts. Having established long-term collaborative relationships with regional and global greenhouse builders, BOAL Group has supplied over 8,000 hectares of greenhouses in over 50 countries. Their systems significantly contribute to feeding a rapidly growing global population whilst minimizing the use of resources.



Bosman Van Zaal

With over a century of experience in the global horticultural industry, Bosman Van Zaal makes you grow. Bosman Van Zaal stands out for its holistic turnkey approach, handling everything in-house, from design to realisation, bringing complex projects to life. Their expertise spans various domains, including process automation, data management, and the creation of fully controlled production facilities including HVAC and irrigation. All under the umbrella of Controlled Environment Agriculture (CEA).

certhon

Certhon develops turnkey, custom-made solutions for the most high-tech horticultural projects, anywhere in the world. Certhon has more than 125 years of experience in horticulture and is based in The Netherlands. With 150 highly trained experts, the company has all the knowledge, know-how and technologies under one roof to enable entrepreneurs all over the world to produce local, fresh food.

Delphy

Delphy stands for Worldwide Expertise for Food & Flowers. Delphy is therefore the company in knowledge and expertise for our partners in the vegetable sectors worldwide. Delphy is active in, among others, China, the Middle East, Turkey, Azerbaijan and South Korea. From Delphy China, Delphy Japan and Delphy Turkey, they work with local experts. In this way, the cultivation knowledge developed in the Netherlands is implemented and applied in and on the local conditions.



FOODVENTURES

FoodVentures manages the entire value chain from soil to supermarket. We believe that high-tech greenhouses are the best solution to feed the global population with fresh and healthy vegetables. We operate modern greenhouses in developing markets to Dutch standards, and sell the produce to demanding supermarkets and restaurants, directly or via channel partners. We delight the consumer with tasty, food-safe vegetables, all year round.



Grodan[®]

Grodan is a supplier of innovative and sustainable stone wool growing media solutions for the professional horticultural sector, based on Precision Growing principles. These solutions are, amongst others, applied for the cultivation of vegetables and flowers, such as tomatoes, cucumbers, sweet peppers, egg plants, roses and gerberas. Grodan combines their offer with tailored cultivation advice and innovative and digital tools to support growers in the sustainable production of fresh produce for the consumer.



hoogendoorn
growth management

Hoogendoorn Growth Management

Together with global partners, Hoogendoorn delivers sustainable automation solutions that seamlessly coordinate all processes and systems in your horticultural organisation. The modular software ensures that the available resources such as natural gas, fertilisers and water are used as efficiently as possible. With this, Hoogendoorn helps its clients to minimise (energy) costs and CO₂ emissions and to maximise crop profitability.



HORTIMEC

Hortimec is a family-owned business that focuses on young plant technology. Our specialized techniques for growing young plants include state-of-the-art spraying booms. These booms are adapted and tailor-made for local requirements, ensuring uniform watering and effective phyto-sanitary treatment. The software that accompanies our spraying booms is developed according to the latest insights, providing advanced control and monitoring capabilities. Additionally, our booms contribute to uniform rooting and growth, as well as effective non-chemical phytosanitary treatment and anti-fungal disinfection. Hortimec is committed to providing innovative solutions for young plant growers in the horticulture industry.



Horti XS is a lean and customer-oriented firm with lots of experience in the field of development, construction and realisation of high-tech horticultural projects. Their expertise lies in the field of supply and engineering of greenhouse projects and we have developed into a leading provider for global horticulture. Horti XS pictures the greenhouse as the backbone of a turnkey project and decides on the strategy, the layout, and the logistics of the project at the same time.



Klasmann-Deilmann is the leading corporate group in the international substrate industry, with numerous sales and production companies in Europe, Asia and America, and a network of sales and production partners on every continent. Our growing media provide worldwide a vital basis for the growth of soft fruit, vegetables, edible mushrooms, herbs, ornamental plants, trees and shrubs.



Koppert Biological Systems produces sustainable cultivation solutions for food crops and ornamental plants. Together with growers and in partnership with nature, Koppert Biological systems work to make agriculture and horticulture healthier, safer, more productive and resilient. They achieve this by using natural enemies to combat pest infestations, bumblebees for natural pollination, and biostimulants that support and strengthen the crops both above and underground



KUBO

At KUBO we can now look back at almost 80 years in horticulture. A stable family company with the third generation now at the helm. KUBO manages complete greenhouse projects. Contracting, engineering, manufacturing, construction and service. All under our own management. This enables us to monitor the entire process, deliver on time and be certain that we are using the latest technologies and concepts.



Modiform offers solutions in cultivation, transport, and packaging systems for the horticulture supply chain based on recycled raw materials. We recover materials from the environment and upcycle these into high-quality, smart, and sustainable products. Modiform was already actively engaged in responsible and sustainable business 45 years ago, and to this day we continue to take new steps towards a cleaner world.



PurpleCrown brings together a team of tech-savvy experts with deep roots in cultivation. Each member boasts years of firsthand experience in the field, making them well-suited for the job. Our main goal is to provide clients with top-notch tools and essential knowledge to achieve the best results in agriculture. All our subsidiaries work together in perfect alignment, driven by a common vision: to lead the way as the worldwide brand house where technology and cultivation come together, benefiting the entire Controlled Environment Agriculture (CEA) sector.



Ridder develops innovative climate, irrigation and management systems for horticultural projects worldwide. Operating globally, the company specialises in adaptive systems that seamlessly match the knowledge level and needs of the local market. With a high-level of expertise and commitment, Ridder offers total solutions to horticulture businesses across the world – from mechanical systems to digital services.



Svensson

Established in 1887, Ludvig Svensson is a family-owned business with more than 130 years of experience in the textile industry. Svensson's climate screens, which are produced in Sweden and sold around the world under the name Svensson, improve the success of professional greenhouse growers, enhancing the overall greenhouse climate. No matter where in the world the operation is located, Svensson knows how to make the most of your natural climate.



Van der Hoeven Horticultural Projects

At Van der Hoeven Horticultural Projects we design, build, and operate tailor-made horticultural solutions for our customers, with a reduced footprint in natural resources, water, CO2, and pesticides. We continuously invest in R&D to strengthen our propositions towards our customers. This vision allows us to operate our business successfully for a better future and sets us on the path of our mission: to provide sustainable taste anywhere.



Viscon Group specialises in factory automation for agriculture and food. Their software, machines, and integrated solutions make food and agriculture processes sustainably profitable, scalable and easy.



Westland: Leading the way in sustainable horticulture and local food production. As Westland, the capitol of the Greenport in West- Holland, we spread the message of aiming for local sustainable food production all around the world. In our municipal role, we emphasize our joint contribution to several of the Sustainable Development Goals of the United Nations, such as 'Zero Hunger', 'Sustainable Cities', 'Good Health and Well-being' and 'Responsible Consumption and Production'.

Let's partner up!

By working together, we can accelerate the transition to more sustainable horticulture and increased food safety and food security in Saudi Arabia, the UAE and Qatar. Together we can unlock the Gulf's full horticulture potential. So, let's exchange information, knowledge, and technology and inspire each other and the rest of the world, how together we can farm the future!



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